

## HBSE 2

### Reflection # 5

1) Adverse Childhood Experiences can impact brain development, the immune system, the hormonal system and the way that our DNA is read and transcribed. People who have ACEs are three times the lifetime risk of heart disease and cancer. Also, there is a 20-year difference in life expectancy between those who have ACEs versus those that don't. ACEs consist of physical, emotional, and sexual abuse. Physical and emotional neglect. Parental mental illness, substance dependence, incarceration; parental separation or divorce and domestic violence.

2) According to Dr. Burke sixty seven percent of the population has experienced at least one ACE, in addition 12.6 percent of population has experienced at least four or more ACEs.

3) Childhood trauma affects the nucleus accumbens (pleasure and reward center). It inhibits the prefrontal cortex that is responsible for impulse control and executive functioning which affects learning. It also affects the amygdala (fear response center). Lastly it can impact the hypothalamic pituitary adrenal axis which is our flight or fight response center. The way this can impact children negatively is by the repeated activation of this stress response. According to Dr. Burke high doses of adversity affect brain function and development.

4) Best practices to treat ACEs are home visits (wellness checks), care coordination, mental health care, nutritional care, holistic intervention and medication when needed.